

2004

**Virginia Department of Transportation
Daily Traffic Volume Estimates
Including Vehicle Classification Estimates**

where available

Special Locality Report

154

Town of Christiansburg

Prepared By

**Virginia Department of Transportation
Mobility Management Division**

In Cooperation With

**U.S. Department of Transportation
Federal Highway Administration**

Virginia Department of Transportation
Mobility Management Division
Traffic Monitoring Section

The Virginia Department of Transportation (VDOT) conducts a program where traffic count data are gathered from sensors in or along streets and highways and other sources. From these data, estimates of the average number of vehicles that traveled each segment of road are calculated. VDOT periodically publishes booklets listing these estimates.

One of these booklets, titled “Average Daily Traffic Volumes with Vehicle Classification Data, on Interstate, Arterial and Primary Routes” includes a list of each Interstate and Primary highway segment with the estimated Annual Average Daily Traffic (AADT) for that segment. AADT is the total annual traffic estimate divided by the number of days in the year. This booklet also includes information such as estimates of the percentage of the AADT made up by 6 different vehicle types, ranging from cars to double trailer trucks; estimated Annual Average Weekday Traffic (AAWDT), which is the number of vehicles estimated to have traveled the segment of highway during a 24 hour weekday averaged over the year; as well as Peak Hour and Peak Direction factors used by planners to formulate design criteria.

In addition to the Primary and Interstate publication, one hundred books are published periodically, one for each of 100 areas across the state defined by VDOT for record-keeping purposes. These books include traffic volume estimates for roads within the county, cities, and towns within the area. These books are titled “Daily Traffic Volumes Including Vehicle Classification Estimates, where available; Jurisdiction Report numbers 00 through 99”.

Also available are a number of reports summarizing the average Vehicle Miles Traveled (VMT) in selected jurisdictions and other categories of highways. There are many different ways to present traffic volume summary information. Because the user determines the value of each presentation, the reports have been redesigned based on user requests and feedback. The people at VDOT Mobility Management’s Traffic Monitoring Section who produce these books welcome requests for other helpful ways of presenting the summary information.

A compact disc (CD) is available that includes files in the Adobe® Portable Document Format (PDF) that can be displayed, searched, and printed using common desktop computer equipment. The CD includes the publications described above as well as a number of other reports, including specialized VMT summaries and smaller AADT reports for each city and town separately.

Publication Notes

Parallel Roads

For road inventory and management purposes, some roadways are counted separately by direction and have separately published traffic estimates for each direction of travel. Examples of such roadways are the interstate system and routes with separated facilities and (usually) one-way traffic facilities in urban areas. In these publications, they are referred to as parallel roads. As a convenience for the users of the publication, the listing for segments of roads with parallel segments are published with both the traffic estimates for their own direction of travel (e.g. I-95 Northbound) as well as the estimate of the total of all traffic on the same route including parallel roadways (all directions of I-95). The publication will have a “Combined Traffic Estimates for Parallel Roadways on this Route” or “Combined Traffic” identifiers for the combined direction of travel estimates.

Roadways such as I-395 with a North segment, a South segment and a separate Reversible lane segment will have the estimate for more than two parallel roadways included in the entire combined traffic estimate.

Some routes have very complicated paths through cities and towns. These parallel paths may be too complex to allow a relationship between nearby sections of the opposite direction on the same route. In this case, to indicate that the traffic estimates for such a road segment may not include all directions of traffic on that route, the line that would list the combined values will indicate “NA” for not available.

VDOT’s traffic monitoring program includes more than 100,000 segments of roads and highways ranging from several mile sections of Interstate highways to very short sections of city streets. Due to problems experienced obtaining some traffic count data, and the level of quality necessary to maintain confidence in the data, no estimate is currently available for some segments of roadway. These segments are included in the publications indicating “NA” for not available. It is the intention of the VDOT’s Mobility Management Traffic Monitoring group to obtain the data necessary and to report traffic volume estimates on all road segments included in these publications.

Many of the road segments in this program are local secondary roads. The amount and detail of data collected on these roads are not as great as the data collected on higher volume roads. The vehicle classification, average weekday traffic volumes, and the theoretical design hour traffic volumes are not calculated for these roads. The publications indicate “NA” for the information that is not available.

This publication is based on a traffic monitoring program initiated in 1997. Because the data collection techniques and statistical evaluation processes are different than those used in previous years, comparison with previous publications may be misleading.

Glossary of Terms:

Route: The Route Number assigned to this segment of roadway with the master inventory route number if this is an overlapping route, with official street or highway name if available.

Length: Length of the traffic segment in miles.

AADT: Annual Average Daily Traffic. The estimate of typical daily traffic on a road segment for all days of the week, Sunday through Saturday, over the period of one year.

QA: Quality of AADT:

- A Average of Complete Continuous Count Data
- B Average of Selected Continuous Count Data
- F Factored Short Term Traffic Count Data
- G Factored Short Term Traffic Count Data with Growth Element
- H Historical Estimate
- M Manual Uncounted Estimate
- N AADT of Similar Neighboring Traffic Link
- O Provided By External Source
- R Raw Traffic Count, Unfactored

4Tire: Percentage of the traffic volume made up of motorcycles, passenger cars, vans and pickup trucks.

Bus: Percentage of the traffic volume made up of busses.

2Axle Truck: Percentage of the traffic volume made up of 2 axle single unit trucks (not including pickups and vans).

3+Axle Truck: Percentage of the traffic volume made up of single unit trucks with three or more axles.

1Trail Truck: Percentage of the traffic volume made up of units with a single trailer.

2Trail Truck: Percentage of the traffic volume made up of units with more than one trailer.

QC: Quality of Classification Data:

- A Average of Complete Continuous Count Data
- B Average of Selected Continuous Count Data
- C Short Term Classified Traffic Count Data
- F Factored Short Term Traffic Count Data
- H Historical Estimate
- M Mass Collective Average
- N Classification Estimates of Similar Neighboring Traffic Link

K Factor: The estimate of the portion of the traffic volume traveling during the peak hour or design hour.

QK: Quality of the Peak Hour estimate:

- A Factor based on 30th Highest Hour Observed During at least 250 days of Continuous Traffic Data
- B Factor based on other Hour Observed During Less than 250 days of Continuous Traffic Data
- F Factor based on Highest Hour Collected at in a 48 Hour Weekday Period
- M Factor based on Manual Estimate of design hour
- N Peak Hour Factor of Similar Neighboring Traffic Link
- O Provided by External Source

Dir Factor: The estimate of the portion of the traffic volume traveling in the peak direction during the peak hour..

AAWDT: Average Annual Weekday Traffic. The estimate of typical traffic over the period of one year for the days between Monday through Thursday inclusive.

QW: Quality of AAWDT:

- A Average of Complete Continuous Count Data
- B Average of Selected Continuous Count Data
- F Factored Short Term Traffic Count Data
- G Factored Short Term Traffic Count Data with Growth Element
- M Manual Uncounted Estimate
- N AAWDT of Similar Neighboring Traffic Link
- O Provided by External Source

Year: Year for which the published values are appropriate. If the Quality of AADT (QA) is “R”, the year is the year that the raw traffic count was collected, and if available,

Route Shield Legend

Route Systems

North 	Interstate Route	Traffic volume data for Interstate Routes and some other routes are reported separately by direction, as well as combined.
	US Route	
	Virginia State Route	
	Secondary Route	

Special Routes

Bus 	Bus - Business Route
	Bypass - Bypass Route
	Truck - Truck Route
	ALT - Alternate Route
	Wye - Wye Route connector
	P - Parallel Route; Southbound or Westbound direction lanes of a numbered route where they are on a different road facility than the other direction.
	The VDOT Maintenance Jurisdiction number is displayed below the Secondary Route Number if the Maintenance Jurisdiction is different than the jurisdiction in the title of the report.

Virginia Department of Transportation
Mobility Management Division
2004
Annual Average Daily Traffic Volume Estimates By Section of Route
Town of Christiansburg

Route	Jurisdiction	Length	AADT	QA	4Tire	Bus	Truck				QC	K Factor	QK	Dir Factor	AAWDT	QW
							2Axle	3+Axle	1Trail	2Trail						
8	Town of Christiansburg (Maint: 60)	0.22	12000	F	96%	1%	1%	1%	1%	0%	F	0.102	F	0.575	13000	F
8	Town of Christiansburg	0.77	13000	F	96%	1%	1%	1%	1%	0%	C	0.086	F	0.500	14000	F
8	To Radford St															
11	Town of Christiansburg	1.40	11000	F	98%	0%	1%	1%	1%	0%	C	0.097	F	0.518	12000	F
11	To SR 8 W Main St															
11	Town of Christiansburg	0.30	4900	F	98%	0%	1%	1%	1%	0%	F	0.095	F	0.567	5400	F
11	To SR 8, Radford St															
11	E Main St	0.12	8200	F	98%	0%	1%	1%	1%	0%	F	0.093	F	0.513	9000	F
11	To Roanoke St															
11	Town of Christiansburg	0.11	12000	F	98%	0%	1%	1%	1%	0%	F	0.092	F	0.507	13000	F
11	To Craig St															
11	Roanoke St	0.98	14000	F	98%	0%	1%	1%	1%	0%	F	0.092	F	0.550	15000	F
11	To SR 111 Depot St															
11	Roanoke St	0.86	17000	F	97%	0%	1%	1%	1%	0%	C	0.095	F	0.553	19000	F
11	To US 460															
11	Roanoke St	1.15	16000	F	95%	0%	1%	1%	2%	0%	C	0.09	F	0.546	18000	F
11	To I-81															
11	Roanoke St	0.09	9800	N	95%	0%	1%	1%	2%	0%	N	0.112	N	0.643	11000	N
11	To Tower Rd, Hampton Rd															
11	Roanoke St	2.01	9800	F	95%	0%	1%	1%	2%	0%	F	0.112	F	0.643	11000	F
11	To ECL Christiansburg															
North	SCL Christiansburg															
81	Town of Christiansburg (Maint: 60)	3.90	22000	F	70%	1%	1%	1%	26%	2%	F	0.069	F		22000	F
North	Combined Traffic Estimates for 2 Parallel Roadways on this Route:	45000		F	71%	1%	1%	1%	25%	2%	F	0.074	F	0.552	45000	F
81	To US 11 US 460															
81	Town of Christiansburg (Maint: 60)	0.77	24000	F	72%	1%	1%	1%	24%	2%	C	0.113	B		24000	F
81	Combined Traffic Estimates for 2 Parallel Roadways on this Route:	48000		F	73%	1%	1%	1%	23%	2%	C	NA			48000	F
South	NCL Christiansburg															
81	SCL Christiansburg															
81	Town of Christiansburg (Maint: 60)	4.27	23000	F	72%	1%	1%	1%	24%	2%	F	0.085	F		23000	F
81	Combined Traffic Estimates for 2 Parallel Roadways on this Route:	45000		F	71%	1%	1%	1%	25%	2%	F	0.074	F	0.552	45000	F
	To US 11 US 460															

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							2Axle	3+Axle	1Trail	2Trail						
South 81		From:	US 11 US 460													
	Town of Christiansburg (Maint: 60)	0.34	24000	F	74%	1%	1%	1%	22%	2%	C	0.113	B		23000	F
	Combined Traffic Estimates for 2 Parallel Roadways on this Route:		48000	F	73%	1%	1%	1%	23%	2%	C	NA			48000	F
	To:	NCL Christiansburg														
		From:	US 460													
111 Cambria Street	Town of Christiansburg	0.79	6700	F	95%	0%	1%	3%	1%	0%	C	0.099	F	0.541	7300	F
	To:	Ellett Rd														
111 Cambria Street	Town of Christiansburg	0.39	6700	G	96%	1%	3%	0%	1%	0%	C	NA			7200	G
	To:	Depot St														
	From:	Cambria St														
111 Depot Street	Town of Christiansburg	0.97	5000	F	97%	0%	1%	1%	1%	0%	F	0.092	F	0.537	5500	F
	To:	Park St														
111 Depot Street	Town of Christiansburg	0.11	5900	F	97%	0%	1%	1%	1%	0%	C	0.089	F	0.552	6500	F
	To:	US 11														
	From:	WCL Christiansburg														
114 Peppers Ferry Road	Town of Christiansburg	1.44	13000	F	98%	0%	1%	0%	1%	0%	C	0.094	F	0.571	15000	F
	To:	Bus US 460														
114 Peppers Ferry Road	Town of Christiansburg	0.63	14000	F	98%	0%	0%	0%	1%	0%	C	0.095	F	0.544	15000	F
	To:	US 460														
	From:	I-81														
460 11 Roanoke St	Town of Christiansburg (Maint: 60)	0.09	9800	N	95%	0%	1%	1%	2%	0%	N	0.112	N	0.643	11000	N
	To:	Tower Rd, Hampton Rd														
460 11 Roanoke St	Town of Christiansburg	2.01	9800	F	95%	0%	1%	1%	2%	0%	F	0.112	F	0.643	11000	F
	To:	ECL Christiansburg														
	From:	NCL Christiansburg														
Bus 460 N Franklin St	Town of Christiansburg (Maint: 60)	0.97	14000	N	90%	0%	1%	1%	7%	1%	N	0.087	N	0.505	14000	N
	To:	SR 114 Peppers Ferry Rd														
	From:	US 11 Main St														
Bus 460 11 E Main St	Town of Christiansburg	0.12	8200	F	98%	0%	1%	1%	1%	0%	F	0.093	F	0.513	9000	F
	To:	Roanoke St														
	From:	SR 114 Peppers Ferry Rd														
Bus 460	Town of Christiansburg (Maint: 60)	0.66	24000	F	95%	0%	1%	1%	2%	0%	C	0.091	F	0.518	25000	F
	To:	US 460														
	From:	E Main St														
Bus 460 11 Roanoke St	Town of Christiansburg	0.11	12000	F	98%	0%	1%	1%	1%	0%	F	0.092	F	0.507	13000	F
	To:	Craig St														
	From:	Roanoke St														
Bus 460 11 Roanoke St	Town of Christiansburg	0.98	14000	F	98%	0%	1%	1%	1%	0%	F	0.092	F	0.550	15000	F
	To:	SR 111 Depot St														
	From:	US 460														
Bus 460	Town of Christiansburg (Maint: 60)	0.18	16000	G	98%	0%	1%	0%	0%	0%	F	0.089	N	0.588	17000	G
	To:	WCL Christiansburg														

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							2Axe	3+Axe	1Trail	2Trail						
Bus 460 N Franklin St	Town of Christiansburg (Maint: 60)	From: 0.11	WCL Christiansburg	To: 1.38	SR 111 Cambria St						F	0.089	F	0.588	35000	F
Bus 460 N Franklin St	Town of Christiansburg	From: 1.38	26000	To: 0.86	Depot St						C	0.090	F	0.542	28000	F
Bus 460 11 Roanoke St	Town of Christiansburg	From: 0.86	17000	To: 0.28	US 460						C	0.095	F	0.553	19000	F
Bus 460 N Franklin St	Town of Christiansburg	From: 0.28	11000	To: US 11 Main St	F	98%	0%	1%	0%	0%	F	0.084	F	0.507	12000	F

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						2Axle	3+Axle	1Trail	2Trail								
Town of Christiansburg																	
1 Falling Branch Rd	0.46	40	F	99%		0%	0%	0%	0%	0%	F	0.381	F	0.594	40	F	2004
				From:	60-640 JB-154 SCL Christiansburg	To:	US 11 Roanoke St										
3500	0.14	2300	F	99%		0%	0%	0%	0%	0%	F	0.108	F	0.617	2500	F	2004
				From:	60-666 JB-154 WCL Christiansburg	To:	SR 8 W Main Street										
3501 S Franklin St	1.21	5600	F	99%		0%	0%	0%	0%	0%	C	0.105	F	0.686	6200	F	2004
				From:	ECL Christiansburg	To:	Alleghany St										
3501 S Franklin St	0.57	6300	F	99%		0%	0%	0%	0%	0%	F	0.092	F	0.773	7000	F	2004
				From:	Alleghany St	To:	US 460 Main St										
3502 Phlegar St	0.08	5000	F	97%		0%	2%	1%	0%	0%	C	0.1	F	0.575	5500	F	2004
				From:	US 11 Main St	To:	First St										
3502 First St	0.40	5400	F	99%		0%	1%	0%	0%	0%	C	0.107	F	0.581	5900	F	2004
				From:	Phlegar St	To:	US 460 Roanoke St										
3503 Depot St	0.12	8800	F	99%		0%	0%	0%	0%	0%	F	0.091	F	0.574	9600	F	2004
				From:	SR 8 App. Loc.	To:	College St										
3503 Depot St	0.14	10000	F	97%		0%	1%	1%	1%	0%	F	0.090	F	0.572	11000	F	2004
				From:	College St	To:	US 11										
3503 Depot St	0.41	14000	F	97%		0%	1%	1%	1%	0%	C	0.088	F	0.542	15000	F	2004
				From:	US 11	To:	C7US 460										
3503 Depot St	0.91	2600	F	97%		0%	1%	1%	1%	0%	F	0.101	F	0.591	2900	F	2004
				From:	C7US 460	To:	SR 111										
3504 Park St	0.87	1900	F	99%		0%	0%	0%	0%	0%	C	0.097	F	0.516	2000	F	2004
				From:	SR 111	To:	E Main St										
3505 E Main St	0.17	1700	F	99%		0%	0%	0%	0%	0%	F	0.099	F	0.521	1900	F	2004
				From:	Roanoke St	To:	Park St										
3506 Ellett Rd	0.39	2000	F	98%		0%	1%	0%	0%	0%	C	0.110	F	0.599	2200	F	2004
				From:	SR 111	To:	NCL Christiansburg										
Allegany St	2200	F															
				From:	Canaan Rd	To:	Miller St				0.103	F			2500	F	2004
Church St	410	F															
				From:	Plum St	To:	King St				0.086	F			450	F	2004
Clearview Drive	2800	F															
				From:	Regan Drive	To:	Wimmer Street				0.111	F			2800	F	2004
Electric Way	400	F															
				From:	Fisher St	To:	Simmons Rd				0.149	F			440	F	2004
North Drive	320	F															
				From:	Depot Street	To:	E. Main Street				0.118	F			320	F	2004
Republic Road	310	F															
				From:	Lester Street	To:	Park Street				0.137	F			310	F	2004
Ridge Rd	90	F															
				From:	Overhill Rd	To:	Dogwood Terrace				0.127	F			100	F	2004

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						2Axle	3+Axle	1Trail	2Trail								
<u>Town of Christiansburg</u>																	
Summitridge Road	700	F				From:	Briarwood Drive				0.105	F	0.6	700	F	2004	
						To:	S. Franklin Street										